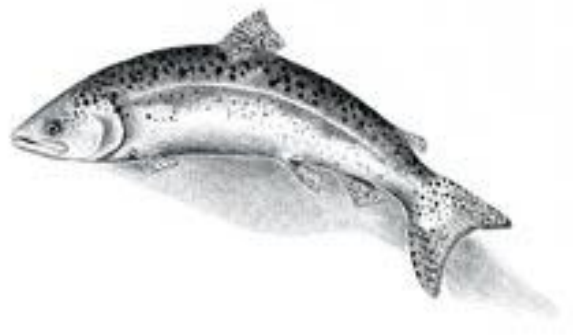




US Forest Service Redwood Sciences Lab Fort Bragg (Arcata) Site Handbook



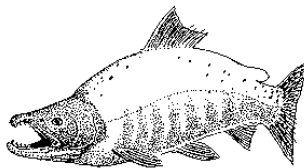
Redwood Sciences Laboratory
1700 Bayview Drive, Arcata, CA 95521
Phone (707) 825-2900
Fax (707) 825-2901

Caspar Creek Watershed Lab
802 N. Main Street, Fort Bragg, CA 95437
Phone (707) 964-1067
Fax (707) 961-1169



Watershed Stewards Project Mission

The mission of the AmeriCorps Watershed Stewards Project is to conserve, restore, and enhance anadromous watersheds for future generations by linking education with high quality scientific practices.





Sockeye Salmon

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Introduction

Site Description	
Arcata	Secondary location
<i>Location</i>	1700 Bayview Drive, Arcata, California
<i>Agency Affiliation</i>	Pacific Southwest Research Station, US Forest Service
<i>General Ecology</i>	Coastal Redwood Forest
Fort Bragg	PRIMARY LOCATION!
<i>Location</i>	802 N. Main St., Fort Bragg, California
<i>Agency Affiliation</i>	Pacific Southwest Research Station, USDA Forest Service Caspar Creek Experimental Watershed
<i>General Ecology</i>	Coastal Redwood Forest

**General Calendar of Duties at USFS RSL** Mentors: Liz Keppeler, Sue Hilton

Month	Location	Site Duties	Work Load	Typical Work Hours
Winter				
October	Field – Caspar Creek	WSP Member Orientation/Storm Duty	Moderate	5 days/wk (M-F 7:30-4:30)
November	Field – Caspar Creek	Storm Duty	Busy	5 days/wk (M-F 7:30-4:30)
December	Field – Caspar Creek	Storm Duty	Busy	5 days/wk (M-F 7:30-4:30)
January	Field – Caspar Creek	Storm Duty/Sediment Lab	Busy	5 days/wk (M-F 7:30-4:30)
February	Field – Caspar Creek	Storm Duty/Sediment Lab	Busy	5 days/wk (M-F 7:30-4:30)
Spring				
March	Field/Office/Classroom	WSP Education/Outreach/Storm Duty	Moderate	5 days/wk (M-F 7:30-4:30)
April	Field/Office/Classroom	WSP Education/Outreach/Storm Duty	Moderate	5 days/wk (M-F 8:00-4:30)
May	Field/Office/Classroom	WSP Spring Training/Education/Station Take-down	Busy	4 days/wk (M-Th 7:00-5:30)
Summer				
June	Field – Caspar Creek	V*, Total Stationing, Surveys and related data entry/analysis	Busy	4 days/wk (M-Th 7:00-5:30)
July	Field – Caspar Creek	Surveys and related data entry/analysis	Busy	4 days/wk (M-Th 7:00-5:30)
August	Field – Caspar Creek	Surveys and related data entry/analysis	Busy	4 days/wk (M-Th 7:00-5:30)
Fall				

This is a general calendar. All locations, duties, and work hours are subject to change due to weather, site needs, and WSP needs.



Description of Site Duties

Members will work in Fort Bragg near the Caspar Creek Experimental Watershed study area during the winter season (Oct thru March). They will learn to monitor and service the 26 gauging stations throughout the rainy winter season while working with Mentor Elizabeth Keppeler and experienced hydrologic technicians. During the summer months the members will work part of the time with mentor Sue Hilton in the Caspar Creek Experimental Watershed doing various types of field work. Also, throughout the year the members will have several opportunities to work in Arcata, learning laboratory procedures, data processing and analysis procedures and providing support with field projects. There they will primarily work with mentor Sue Hilton and co-mentors Diane Montoya and Jayme Seehafer, and possibly with other laboratory staff.

For the most part the duties of AmeriCorps member(s) can be fit into the following categories:

1. Caspar Creek Winter Field Work
2. Sediment Lab
3. Summer Field Work and Related Computer Work
4. Caspar Creek Data processing and Related Computer Work

<i>Winter field work</i>	<ul style="list-style-type: none"> • Service and maintain gauging stations including data loggers, flow and turbidity sensors and automatic samplers. • Perform storm duty (visiting gauging stations to ensure proper operation, take auxiliary samples and real-time observations). • Service and maintain other hydrologic instrumentation (rain gauges and climate sensors). • Survey streams for erosion features, cross-section changes • Watershed surveys (total station) to better characterize watershed topography and key features. • Minimal data entry, analysis, office work
<i>Sediment Lab</i>	<ul style="list-style-type: none"> • Making an inventory of the suspended sediment (TTS) sample bottles coming from Fort Bragg sample sites • Processing suspended sediment sample bottles sent up from Fort Bragg <ul style="list-style-type: none"> • Washing and weighing filters in preparation for filtering, • Filtering, washing bottles and caps, weighing bottles, and recording data, • Cooking and weighing filters containing sediment, • Occasionally special processing procedures (sand fractions and DI, or Depth Integrated sample bottles) • Data entry (after all bottles have been processed for the year).
<i>Field Work and Related Computer Work</i>	<ul style="list-style-type: none"> • During the wet months field work at Ft. Bragg, will consist of assisting in maintaining suspended sediment sampling equipment and collecting samples during storm periods. • Summer field work starts the beginning of June and can last into September depending on how much there is. • Field work is conducted mainly in the Caspar Creek watershed in the Ft. Bragg area. • Headcuts – this involves locating, measuring, and monitoring these erosional features in the Caspar Creek Watershed. • V* surveying – V* is a measure of the supply of excess fine sediment (sand and fine gravel) in gravel bed channels (see the RSL website for more details on this). • Entering data gathered during field work. • Analyzing streambed cross sections. • Analysis of Caspar Creek soil samples' particle size using the Coulter Counter.
<i>Caspar Creek</i>	<ul style="list-style-type: none"> • Organizing data from gauging stations and updating spreadsheets



<i>Caspar Creek Data Processing and Related Computer Work</i>	<ul style="list-style-type: none"> • Extract data sent from gauging stations and add to master lists. • Rainfall Processing and Adjusting • Adjusting stage and turbidity data in Free Adjuster • Estimating Sediment Loads in R (a statistical programming language) • Defining storm periods • Analysis of past records for trends and changes. • Piping Processing and Adjusting
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ISPs and Outreach Events

ISP Notes

Arcata ISPs

There are several environmentally focused non-profit organizations that can be good resources for ISP ideas. HSU and governmental agencies will also let you carry out some part of an ongoing restoration project if it is appropriate and you are interested. In 2010 the AmeriCorps ISP was willow planting as the final stage of a restoration project being done by the Northcoast Regional Land Trust. RSL is very supportive of AmeriCorps duties such as this, and individual scientists may have suggestions or know of areas that need various kinds of restoration.

Sample **ISP proposals** can be found on @ O:\water\share\Americorps within each year's folder. An example has been included below.

Donations

Go to O:\water\share\Americorps to find spreadsheets of donors, media contacts, as well as ISP proposals, letters and flyers from past years. Below are just a few donors from previous years.

- North Coast Coop – 811 I Street, Arcata 95521 – 822-5947
- Eureka Natural Foods – 1450 Broadway Street, Eureka, 95501 – 442-6325
- Wildberries Marketplace – 747 13th Street, Arcata, 95521, Contact – Aaron Gottchalk
- Note: Donation requests are most successful if submitted early in the month.

Fort Bragg

Mendocino Woodlands State Park has a problem with invasive English ivy and did have a problem with trash in Railroad Gulch. Past members from DFG Fort Bragg teamed up with Mendocino Land Trust in conducting their ISP. Land Trust and Save The Redwoods League staff may be helpful in continuing his work. In 2011 and 2012 members facilitated invasive weed eradication at Russian Gulch State Park. Future projects might involve the gorgeous and remote Sinkyone Wilderness State Park.

More contacts

Mendocino Land Trust
PO Box 1094
Mendocino, CA 95460

Helene Chaffin
(707) 964-1825
Email: jughandle-ed@mcn.org

Jughandle Creek Farm and Nature Center
(707) 964-4630
email: jughandle@creek.org

Brian Barrett (JDSF)
Email: Brian.Barrett@fire.ca.gov

Josh Ertl
Sinkyone Wilderness State Park
Email: jertl@parks.ca.gov

Bill Maslach
California State Parks
bmaslach@parks.ca.gov



Outreach Notes

Arcata

Let your mentor and people around you at RSL know about dates you will need for outreach. RSL is supportive of these activities, but enough time should be allowed to make arrangements when the workload is heavy at RSL.

In 2010 the only RSL-specific outreach duty was bringing watershed/water activities to the kids of Eureka's day camps at the Ryan Learning Center and at Carson Park. The AmeriCorps members did similar activities as those presented in Real Science including water cycle bracelets, watershed/enviroscape model, fish prints, fish life cycle, web of life, roh-sham-boh, and bear-mosquito-salmon.

The "Kids in the Woods" program was started in 2008 with idea being that RSL scientists would participate in this environmental summer day camp by giving local kids ecological lessons in their field. In 2010 AmeriCorps members did not participate in this; however this may be an interesting potential for RSL outreach for AmeriCorps in the future.

Fort Bragg

*Mendocino
Coast
Botanical
Gardens*

This is where DFG Fort Bragg members did most of their outreach for the mandatory service days. The Mendocino Coast Botanical Gardens have volunteer groups several days a week and are always happy to have more volunteers.

Mario Abreu @ (707) 964-4352 ex. 23

<http://www.gardenbythesea.org/volunteer/>

In April the 2009 DFG Fort Bragg members joined Sean Gallagher in judging 7th to 11th grade participants in the Ukiah Science fair held at Mendocino College in Ukiah.

Noyo Radio Project (KNYO Community Radio) welcomes the opportunity to open the airwaves to Watershed Stewards for education and outreach (707-964-6968)

There are several other places in the area that would be great places to complete outreach hours, such as the humane society or local food banks.

Mendocino Land Trust, Mendocino Coast Animal Shelter.

Calendar of Outreach Events for Site / Community

Arcata

Being in the heart of the Humboldt Bay Region, there are many WSP approved volunteer opportunities. Some examples of past opportunities have been::

- MLK Jr. Day – Disaster Preparedness
- English Ivy Removal at Sequoia Park
- Leading a Ma-le'l Dunes Walk
- Leading a Lanphere Dunes Walk
- Lanphere Dunes *Bromus* removal
- Creek Days – educating school kids about fisheries, as well as tracks and scat
- Fish printing at Ferndale Science Night
- Hoopa Fish Fair
- Campbell Creek Tree Planting
- No Ivy Day
- Jacoby Creek Land Trust Native Plant Propagation & Invasive Species Removal
- Humboldt Wildlife Care Center
- Highway Clean-Up Friends of the Dunes Ocean Day
- Manila European Beachgrass Removal
- Weaverville Watershed Day
- Individual Service Projects at Lanphere involving the removal of an invasive cordgrass
- Expanding Your Horizons – Conference for 5th-8th grade girls
- The Raven Project Garden Workday



- Fort Bragg**
- Redwood Roots Farm Invasive Blackberry Removal
 - Lanphere Lupine Bash
 - Ma-le'l Lupine Bash
 - Scotch Broom Removal
 - Volunteering at Sequoia Humane Society or other animal shelter
 - World's Largest Salmon Barbeque - An annual event, the World's Largest Salmon Barbeque, is held the weekend of July 4th to benefit the Salmon Restoration Association. The DFG and WSP wish to have continued involvement in the future. AmeriCorps members work an AmeriCorps table at this event. <http://www.salmonrestoration.com/bbqmain.html>
 - Mendocino Coast Whale Festivals - Held each year in March the Whale Festivals in Mendocino and Fort Bragg have a wide variety of activities, some of which you could volunteer for. <http://www.mendowhale.com/>
 - Helene Chaffin with Jughandle Creek Farm and Nature Center also organizes a variety of outreach events.

Other Supporting Community organizations

- Arcata**
- Adult Day Health Care Mad River
 - Funeral Consumers Alliance of Humboldt
 - Humboldt Crabs Baseball, Inc.
 - Friends of the Dunes
 - Consumer Credit Counseling Service
 - Humboldt Handmade
 - Humboldt Community Breast Health project
 - Manila Community Services District Parks & Rec
 - Arcata House
 - Northcoast Environmental Center
- Fort Bragg**
- Fort Bragg Senior Center
 - Fort Bragg Community Food bank
 - Parents & Friends, Inc.
 - Mendocino Coast Children's Fund
 - Habitat for Humanity of the Mendocino Coast
 - Mendocino Coast Parks and Recreation District
 - Soroptomists International
 - Art Explorer's
 - Big Brothers Big Sisters

Education

Prior members left folders with lesson plans in the site box. The sixth lesson plan was different for each class. In one class a giant Jeopardy poster was created in order to review for post test, and in another class stream assessment was done (included water quality testing, macroinvertebrate presence, temperature).

Sample education logs can be found in the site box. 2008 members did a great job organizing their education materials. Visit their education folder @ K:\water\share\Americorps\08.

Sample education logs are shown below:

Education Logs (2011/12)

Member Name(s)	<u>Michelle Dow and Rand Shoaf</u>
-----------------------	---



Dates of Real Science Visits	<i>3/19-4/4 every Monday for 6 weeks</i>
School Name	<i>Redwood Elementary</i>
Teacher Name	<i>Lydia Mantel</i>
Teacher Contact Info (Email, Phone, Address) Please indicate the best way to reach this teacher	lydiamantel@yahoo.com , email is best
Grade Level	1

<p>Was teaching this class a positive experience?</p> <p>If not, please include a note about the issues. (i.e the school uses WSP for consecutive years and the students already know our curriculum, teacher is difficult to work with, etc.)</p>	<p>Teaching Lydia's class was a very positive experience, she is extremely helpful with lesson plans and discipline in the classroom. She loves WSP in the class and I would highly recommend working with her</p>
<p>Please include the lessons that you taught plus any information that will be helpful to next year's members-</p> <p>The pre-test was taken the week before I had my first visit.</p> <p>Week 1: Components of hydrological cycle (defined, had children draw on the board different components and ended with water cycle bracelets)</p> <p>Week 2: Watershed (define watershed, drew large watershed on board and had children add to it and did smaller groups for crinkle paper watershed)</p> <p>Week 3: Habitat (did the habitat chat bag, had children draw their own habitat to explain necessary components)</p> <p>Week 4: Salmon life cycle (defined, sang little egg, alevin, fry and smolt song, made a chain link of life cycle for activity salmon, bear, mosquito)</p> <p>Week 5: Field trip! (took children to egg collecting station and set up 6 different stations that small groups went around to, contact DFG WSP for access)</p> <p>Week 6: review, dissection and salmon anatomy, post-test</p>	

Past Education Logs (2007)

Member Name(s)	<u>Sam Price & Newt Burks</u>
Dates of Real Science Visits	<i>03/15/2007 to 04/06/2007</i>
School Name	<i>Arcata Elementary</i>
Teacher Name	<i>Charlene Crump</i>
Teacher Contact Info (Email, Phone, Address) Please indicate the best way to reach this teacher	crumpco@humboldt1.com, (707) 822-4858, phone is the best way to contact.
Grade Level	3rd



<p>Was teaching this class a positive experience?</p> <p>If not, please include a note about the issues. (i.e the school uses WSP for consecutive years and the students already know our curriculum, teacher is difficult to work with, etc.)</p>	<p>Yes, but there were 6 students who already knew the curriculum.</p>
<p>Please include the lessons that you taught plus any information that will be helpful to next year's members-</p> <p>Week 1: pre-test, water cycle & watershed Week 2: life cycle Week 3: habitat - there seemed to be a number of student with family members who are farmers. They seemed to be a somewhat sensitive to the discussion about the impacts of farming on salmonid habitat. Week 4: fish anatomy Week 5: ways you can help salmon, review, post-test</p>	

Education Logs (2008)

Member Name(s)	<u>Basilia López</u>
Dates of <i>Real Science</i> Visits	04/03/2008 to 05/02/2008
School Name	Fuente Nueva Charter School
Teacher Name	Jennifer Glueck
Teacher Contact Info (Email, Phone, Address) Please indicate the best way to reach this teacher	jenglueck@gmail.com, (707) 822-3348
Grade Level	2 nd and 3 rd
<p>Was teaching this class a positive experience?</p> <p>If not, please include a note about the issues. (i.e the school uses WSP for consecutive years and the students already know our curriculum, teacher is difficult to work with, etc.)</p>	<p>Yes, the teacher was super helpful. I translated all my lessons in Spanish. This helped me to build up the watershed vocabulary in Spanish.</p>
<p>Please include the lessons that you taught plus any information that will be helpful to next year's members-</p> <p>The pre-test was taken the week before I had my first visit. Week 1: Water in general (history, use, hydrological cycle definition, components of hydrological cycle, and for activity water cycle bracelets). Week 2: Watershed (define watershed, diagram, watershed model, water storage, and for activity soil particle size experiment). Week 3: Water quality (macro-invertebrates, field trip)</p>	



Week 4: Ecology (ex. food change, diagram, habitat box chat, for activity salmon, bear mosquito)
Week 5: Salmon history how native Americans depend on salmon, salmon life cycle, slide, egg-fry
Week 6: review, dissection and salmon anatomy, post-test (The last two visits we needed at least two hours to finish the lessons)

Education Notes

Local Schools

There are many schools in the area; some are large public schools with many classes for each grade, others are smaller charter schools that often have several grades in the same classroom, and others are very small rural schools in which all the students live in very remote areas and know both the local area and people. Most schools have had the WSP Real Science Curriculum over the years, and most kids that grow up in these coastal and riverine towns have personal experience with the anadromous fish. RSL is a very helpful resource for finding relevant photos, copying and creating documents, and borrowing scientific equipment for display.

Advice

Learn the teacher's teaching style so that you can learn how to seamlessly fit your curriculum into the teacher's day. This can be done by visiting the classroom as an observer before planning your lesson. Also, listen to how the kids answer questions on your first visit to gauge their interest and prior knowledge of the curriculum, and change or create the lesson plans for the next visits to challenge and surprise them.

Local Issues

Some students have family members or relatives engaged in ranching or farming. Ask the teacher about sensitive subjects such as those. Focus on how farming and ranching can be harmful for streams, but talk about ways that farmers and ranchers can help protect salmon and trout (ex. Putting up fencing to keep cattle out of creeks, using less pesticides, etc.).

Site / Region Specific Education Resources

Arcata/Eureka Area

Six Rivers South Operations Office, Eureka

There is an elaborate flume table there that demonstrates erosion and fluvial geomorphology using actual sediment and running water that is always a success.

Humboldt Bay Keeper, Eureka

Humboldt Bay Keeper has a large portable model of a watershed complete with human influences (logging, ranching, cities), and is intended to have water added to see how runoff can carry pollutants. In 2010 this model was checked out for both the Hoopa Fish Fair and Eureka day camps.

Redwood Sciences Laboratory

RSL has all types of office equipment that may be useful such as, photocopier, color printers, poster-size color printer, and scanner. Unfortunately, they do not have a large laminator. The various departments are also likely to loan specimens and scientific equipment for display or use in education. In addition to the Watershed group, RSL offices also house a wildlife group which includes researchers in Fisheries, Mammals, Birds, Herps, and other critter-lovers.

Fort Bragg Area

School

Location

Phone Number (707 area code)

Dana Gray Elementary

Fort Bragg

961-2865

Redwood Elementary

Fort Bragg

961-2860



Fort Bragg Middle School	Fort Bragg	961-2870
Fort Bragg High School	Fort Bragg	961-2880
Noyo High School	Fort Bragg	961-2889
Mendocino Grammar School	Mendocino	937-0515
Mendocino Middle School	Mendocino	937-0564
Mendocino High School	Mendocino	937-5871

Local Ecology

Descriptions of Local Ecology

Arcata	Arcata is so beautiful. The redwood forest just behind RSL is a second-growth forest with remnant old-growth stumps. There are trails throughout the forest that people often use for jogging or to walk their dog. The forest also has a very popular frisbee golf course in it ("the Redwood Curtain"). It also plays host to mushroom hunters just after the rains and the occasional mountain lion. Stay alert!
<i>Samoa Peninsula</i>	Samoa Peninsula leads out to the north spit of Humboldt Bay, and the beaches are often used by surfers. The dunes along the peninsula are important for many native species and volunteers have been working to maintain the integrity of the dune ecosystem.
<i>Arcata Marsh</i>	The Arcata Marsh and Treatment Plant sits on the edge of the bay, and the trails there are great bird-watching areas. You might also see river otters there! The sewage treatment plant employs the marsh in a very unique system of filtration before the water is dumped into Humboldt Bay.
<i>Mad River</i>	The closest river is the Mad River, but the area that passes through town to the mouth has not been a healthy riverine system in many years. There are nice swimming holes farther up the river where it is healthier near Maple Creek, and some on the Trinity River toward Hoopa.
<i>Avian Treats</i>	There are also different raptors, such as kites and red-tailed hawks that patrol the agricultural fields along Highway 101 toward Eureka and along Samoa Boulevard for voles and mice. Ospreys search the sloughs for fish. These fields are also a major pit stop for the migrating Aleutian geese.
<i>Sunshine</i>	The coast can get a bit foggy in the summer months. Head inland and you'll be in sunshine and 100 degree weather. Great areas to explore inland include all rivers in the Humboldt Del Norte Region – Smith, Trinity, Klamath, Mad, Eel, Van Duzen, and Salmon. Backpacking in the Trinity Alps, Marble Mountains, Yolla Bollyes, Siskiyous, and Klamath Mountains is always a treat. For a quick getaway from Arcata go bask in the sunshine at Big Rock in Willow Creek.
<i>Berry Heaven</i>	There are also many kinds of edible natives that grow in the area, including both native and Himalayan blackberry, salmon berry, huckleberry, thimbleberry, and salal. You must check out the blueberry farm, Wolfsen's, on the way to the rock lab in McKinleyville!
Fort. Bragg	Surrounded by the spectacular natural beauty of Northern California's redwood forests and the Pacific Ocean, Fort Bragg is an ideal destination. Located in historic Mendocino County, it is the largest town on the scenic North Coast between San Francisco and Eureka. This gorgeous area offers a unique blend of natural resources, recreation, and scenery. Go hiking, kayaking, tide pooling or abalone diving. The



Caspar Inn is a great place to see live music. The Lost Coast is an amazing hike and the Mendocino portion can be started just north of Fort Bragg at Usal Camp. The Jackson Demonstration Forest offers many opportunities for dispersed recreation including hiking, mountain-biking, and horseback riding.

Coastal Redwood Forests

Coastal redwood forests occur along a 450 mile strip of land from Southern Oregon to Monterey, California. Since coast redwood trees, which dominate the forest, prefer sheltered, well-watered places with rich soil, the forest are rarely more than 20 miles inland from the Pacific Coast and can reach up to 2,000 feet in elevation (basically as far inland as the fog drifts). Coastal Redwood trees are the world's tallest trees, often growing over 300 feet tall. Coastal Redwoods are also some of the oldest living trees with some reaching over 2,000 years in age. Forests may also contain other trees such as douglas fir, grand fir, hemlock, bishop pine, tanoak, alder, madrone and bay myrtle. Black bears, Roosevelt elk, deer, raccoons, squirrels, porcupines, salamanders, newts, and the yellow banana slug are also some organisms that live in the coastal redwood forest.

Pygmy Forest

These unique forests consist of trees and shrubs which have stunted growth and are low to the ground. Acidic soils with poor fertility and a shallow nearly impermeable hardpan restrict the growth of many plants in the area causing dwarf conditions in many of them. Although the trees may reach 100 years in age, they rarely grow taller than 6 feet.

Coastal Prairie

Located along the Pacific Ocean, coastal prairie makes up most of the headlands along the Mendocino Coast. Wind, salt spray, grazing and fire are some of the natural disturbances that help to maintain these open grasslands. Coastal prairies of California are some of the most diverse grasslands in North America.

Rocky Intertidal Shore

The rocky intertidal shore is the area on the coast between the high and low tide marks. Alternatively exposed to the air and submerged completely below the water, the organisms that inhabit this area have adapted to harsh extremes. This narrow strip of habitat usually contains a high diversity of species. Some of the organisms occupying the rocky intertidal shores of the Mendocino Coast include sea anemones, sea stars, chiton, sea urchins, limpets, mussels, snails, and crabs.

Housing and Local Resources

Housing

During the winter months members will be living and working in the Fort Bragg Area and will need to secure housing in Ft. Bragg for this time. During the summer field season, members will be doing field work in Ft. Bragg, but will have the option of moving to the Arcata area and commuting weekly to Ft. Bragg with mentor Sue Hilton.

Arcata

Houses in Arcata are expensive (about \$275,000 to \$450,000 for a house or condo). However, renting is popular, as this is a college town, and new students looking for apartments are expected. It is also common to share the rent for a house among several people. Apartments can be reasonable, especially if you're willing to live in McKinleyville or Eureka (from around \$500 for a studio to \$700-\$1100 for a larger place). There are two subsidized housing complexes (HUD low-income housing) in Arcata, one on Alliance called Humboldt Plaza and another on Hallen Drive off of Valley East called Redwood Community Homes, Inc., but qualifying is difficult.



Websites

Here are some websites to check out for housing options:
<http://times-standard.townnews.com/classifieds>
<http://humboldt.craigslist.org/>
<http://www.hsu.och101.com>

Fort Bragg

Housing can be hard to find in Fort Bragg. It is especially hard to find affordable one-bedroom rentals. You may want to find a roommate or two with whom to live. This will decrease your monthly rent and make it a little easier to find a place. The realtors often have listings for apartments and houses available. The Fort Bragg Advocate News and the Mendocino Beacon also have rentals listed in their classifieds. Online sites, such as Craigslist, may also be helpful.

The Learning Center and Jackson State Forest Barracks are great places to stay for free, but you may have to share your space, especially in the summer. The Learning Center is approximately 20 miles from downtown and is situated on a beautiful creek, while the CAL FIRE Barracks are located right in downtown adjacent to the office.

Century 21

809 N. Main Street
Fort Bragg, CA 95437
(707) 964-2121

<http://www.mcn.org/d/pclark/ftbragg/default.ncl>

Fort Bragg Advocate News

<http://www.advocate-news.com/>

The Mendocino Beacon

<http://www.mendocinobeacon.com/>

Local Resource Contacts

Arcata

Low Income Services

Food stamps and other low-income services: Dept. of Human and Health Services, 929 Koster, Eureka, CA 95501

Grocery Stores

- Wildberries Marketplace – 747 13th St., Arcata, open daily 7:00 am- 11:00 pm
- North Coast Co-op – 811 I St., Arcata & 25 4th St., Eureka, open daily 6:00 am – 9:00 pm
- Eureka Natural Foods – 1450 Broadway St., Eureka, open M-F 7:30 am – 9:00 pm, Sat 8:00 – 9:00 pm, Sun 8:00 am – 8:00 pm
- Safeway – 600 F St., Arcata
- Ray's Food Place – 500 Valley West Blvd, Arcata
- WinCo Foods – 636 W. Harris St., Eureka, open 24 hours a day – this store has some of the cheapest food in the area, but is mostly not organic.

Newspapers

Times-Standard – www.times-standard.com
Eureka Reporter – www.eurekareporter.com
North Coast journal – www.northcoastjournal.com
Arcata Eye – www.arcataeye.com

DMV

322 W. 15th St., Eureka
Phone: 1-800-777-0133
Hours: M,T,Th,F – 8:00 am to 5:00 pm



W: 9:00 am to 5:00 pm

- Bus, Shuttles etc.* Public Transportation information at 9th and E
Post Office 799 H St., Arcata
Phone: 707-822-4670
Hours: M-F – 8:30 am to 5:00 pm
- Recycling* Arcata Community Recycling
1380 Ninth St. (Ninth & N), Arcata
Phone: 707-822-4542
Hours: M-F 9:00 am to 6:00 pm
Sat & Sun – 9:00 am to 5:00 pm
- Arcata Library* 500 7th St., Arcata 95521 – Located behind Arcata City Hall
Phone: 707-822-5954
Website: <http://co.humboldt.ca.us/library/>
Hours: Tuesday – Noon to 5: pm
Wednesday – 10:00 am to 5:00 pm
Thursday – Noon to 8:00 pm
Friday – Noon to 5:00 pm
Saturday – 10:00 am to 5:00 pm
- RAVEN Project* Individualized help for young people up to age 21
523 T Street, Eureka, CA 95501

Fort Bragg

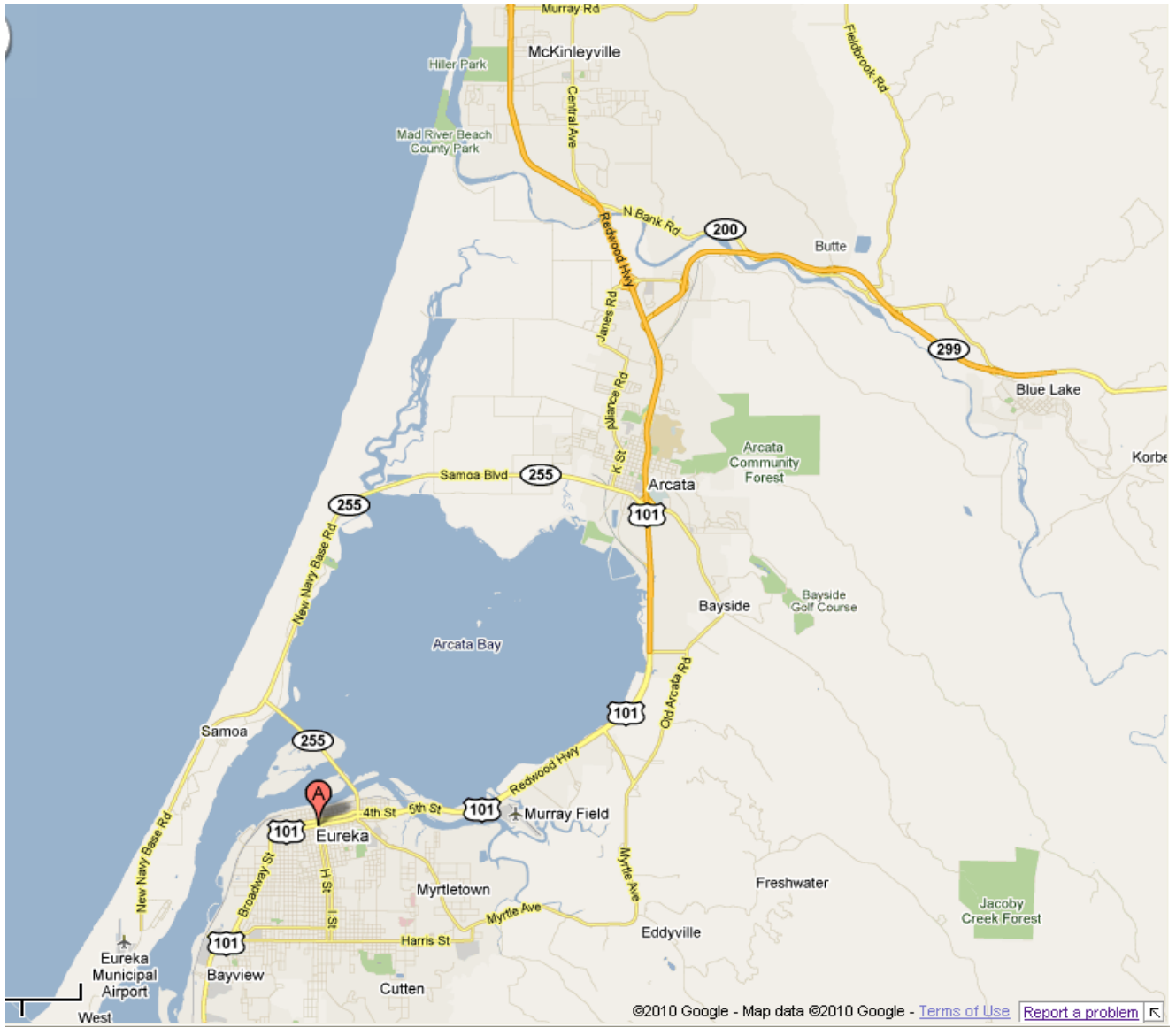
- Grocery Stores*
- Safeway – 660 S. Main, Fort Bragg, CA 95437
 - Harvest Market - 171 Boatyard Dr., Fort Bragg, CA 95437
 - Purity – 242 N. Franklin, Fort Bragg, CA 95437
 - Down Home Foods – 115 Franklin St., Fort Bragg, CA 95437
- Low Income Services*
- 825 South Franklin Street
Fort Bragg, CA
(707) 962-1000
- Library*
- 499 East Laurel Street Fort Bragg, CA 95437
(707) 964-2020
- Bus, Shuttles etc.*
- MTA: http://www.4mta.org/schedule_maps.php
- Post Office*
- 203 N FRANKLIN ST. FORT BRAGG, CA 95437-9912
- Health&Fitness*
- Mendocino Coast Recreation and Park District
C.V. Starr Community Center
300 S. Lincoln St., Fort Bragg, CA 95437
Phone (707) 964-9446
<http://www.mendocoastrec.org/contact.html>



Community Information

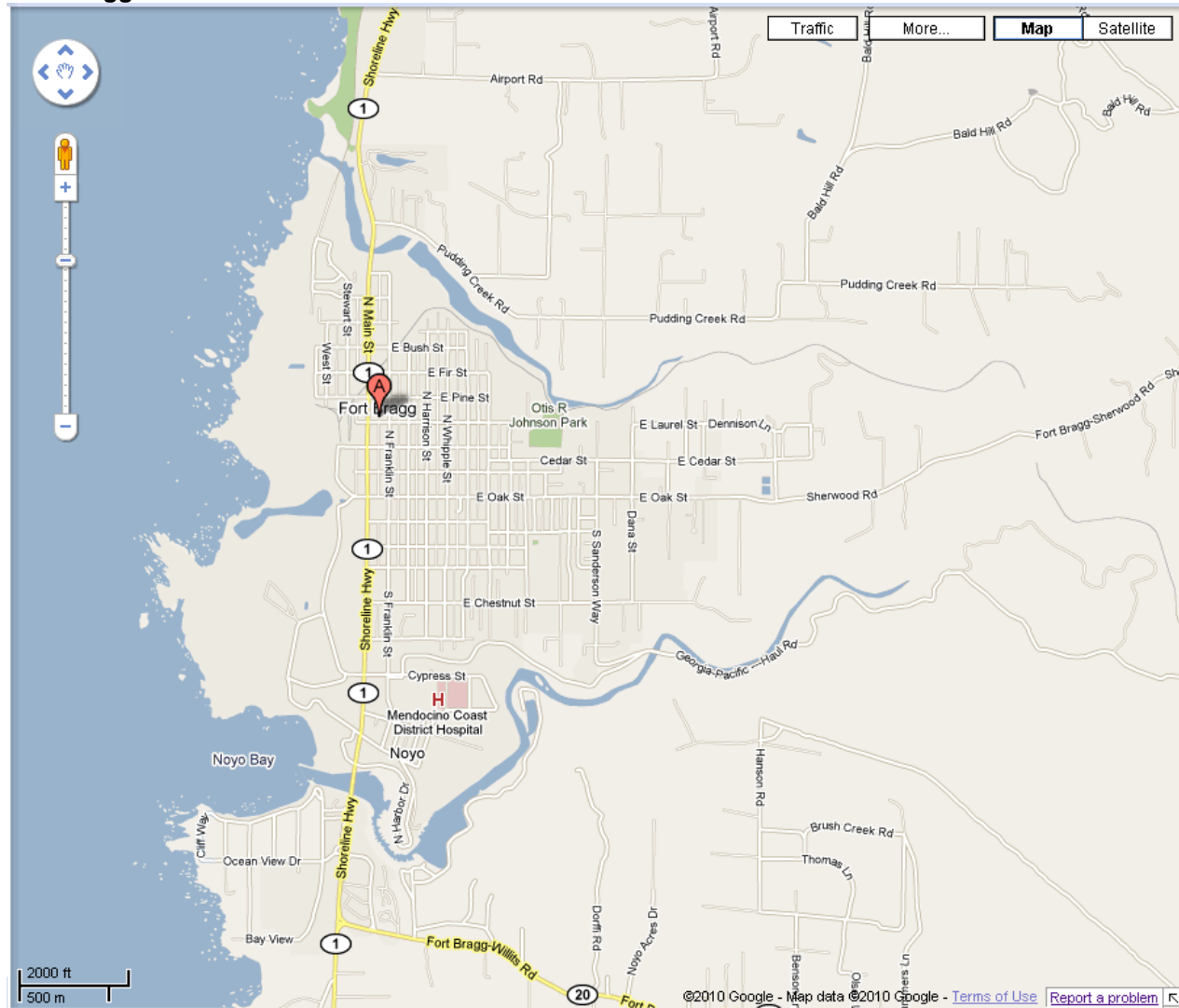
Map of Area

Arcata/Eureka





Fort Bragg



Community Demographics

Arcata

Population

Estimated population in July 2006: 16,888

Economy

Estimated median household income in 2005: \$23,600; Estimated median house/condo value in 2005: \$335,600

Ethnicities

- White Non-Hispanic (81.3%)
- Hispanic (7.2%)
- Two or more races (5.3%)
- American Indian (4.8%)
- Other race (3.5%)
- Black (1.6%)
- Japanese (0.5%)



*Education/
Employment*

For population 25 years and over in Arcata

- High school or higher: 87.6%
- Bachelor's degree or higher: 41.6%
- Graduate or professional degree: 13.6%
- Unemployed: 8.9%
- Mean travel time to work: 15.1 minutes

Fort Bragg

Population

6,580 (year 2009)

Males vs.

3,523 (50.1%) vs. 3,503 (49.9%)

Females

Median Age

36.2 years

Ethnicity

White Non-Hispanic (70.9%), Hispanic (22.7%), Other race (12.1%), Two or more races (4.6%), American Indian (3.8%), Black (1.0%)

Community Services

Arcata

City websites

<http://www.arcatacityhall.org/> and <http://www.cityofarcata.com>

Police Dept.

Non-emergencies: T: (707) 822-2428, F: (707) 822-7936

Fire Dept.

631 Ninth Street

Mad River Hosp.

T: (707) 822-3621

Fort Bragg

City websites

<http://www.city-data.com/>

Police Dept.

250 Cypress St. 707-961-2800 Business Calls
707-964-0200 Dispatch

Fire Dept.

141 N. Main St. 707-961-2831

*Mendocino
Coast Hospital*

700 River Dr. 707-961-1234

*Fort Bragg
Library*

499 Laurel St. 707-964-2020

Community Contacts

Arcata

*Volunteer
Sources*

- All local WSP members would be glad to point you in the right direction (lean on those second year members).
- HSU Geology and Natural Resources Department are well-acquainted with RSL.
- Natural Resources Club at HSU always provides good volunteers for ISP's, etc.
- Fraternity, sorority, and certain freshman groups (FIG) are often required to participate in some amount of community service work.

*Friends of the
Dunes*

Emily Walter – Restoration Coordinator, emily@friendsofthedunes.org
(707) 444-1397

*Humboldt Bay
National Wildlife
Refuge, USFWS*

Patricia Clifford – Natural Resource Specialist, Lanphere Dunes Unit
(707) 822-6378, Patricia.Clifford@fws.gov

California Native

Suzanne Isaacs – Invasive Plant Specialist, sli@reninet.com



Plant Society (707) 668-1821

Audubon Society Pablo Herrera – RSL scientist in the bird lab, icteria@hotmail.com
(707) 845-8166

*City of Arcata
Environmental
Services* Dennis Houghton, Natural Resources Division, dhoughton@cityofarcata.org
(707) 825-2163

Entertainment and Community Events

Resources for Affordable Entertainment Options

Arcata

Current Events Check the weekly calendar in the North Coast Journal –
<http://www.northcoastjournal.com/calendar.html>

Music Events <http://www.humboldtmusic.com/>

Socializing Humboldt Brews and Six Rivers Brewery for live music, Mosgo's Café for family friendly table games, WiFi and live music

Activities HSU Center Arts for workshops and public outings – <http://www.humboldt.edu/~carts/>
Arcata Community swimming pool, HealthSport, and of course, nature watching of all kinds

Museums HSU Natural History Museum – 1315 G Street, Arcata (707) 826-4479
Clarke Historical Museum – 240 E Street, Eureka (707) 443-1947
Morris Graves Museum of Art – 636 F Street, Eureka (707) 442-0278
Arcata Marsh Interpretive Center – 600 South G Street, Arcata (707) 826-2359
Sequoia Park Zoo – 3414 W Street, Eureka (707) 442-6552

Movies Figuerido's Video Movies (rentals)
Minor Theater – (707) 822-1220
Broadway Cinema – (707) 444-3456
Mill Creek Cinema – (707) 839-2222

Fort Bragg There are many outdoor activities in the area that can be done for little or no cost. The Mendocino Coast has several state parks and reserves offering a variety of places to hike, bike, tide-pool, or enjoy other great outdoor activities.

Also, many places in the area give discounts for locals, so it is usually good to mention you live in the area.

Coast Cinemas 167 S. Franklin, Fort Bragg, CA 95437 707-964-2019
Tuesdays is discount day at the movies. Most movies (except for a few new releases) are \$4.00 all day Tuesdays.

*Emerald Dolphin
Mini Golf* 1211 S. Main, Fort Bragg, CA 95437 707-964-6699

Recurring Event List

Arcata

Monthly Arts Arcata! and Arts Alive! (Eureka)



<i>Weekly</i>	Farmer's Market (from April 14 th – November 17 th)
<i>Annually</i>	North Country Fair, Oysterfest, 4 th of July Celebration on the Plaza, Pastels on the Plaza, Kinetic Sculpture Race, Blues by the Bay, Dancin' in the Dunes, Paddle to the Headwaters, Folk Life Festival, Woofstock (for dog owners)
Fort Bragg <i>First Fridays</i>	Galleries and shops welcome the community to experience art and culture in Fort Bragg the first Friday of every month. From street theater and gallery openings to coffee house concerts, First Friday in Fort Bragg is a must do for visitor and locals alike.
<i>Fort Bragg</i> <i>Farmer's Market</i>	Wednesdays, May – October, 3:30 p.m. – 6 p.m. In the heart of Fort Bragg, Spruce & Main Sts. Vendors bring a wide variety of foods including fine crafted cheese, fresh fish, honey, fruits, vegetables, and flowers.

Helpful Hints

Field work

- All summer field work takes place in Fort Bragg. If you decided to live in Arcata this means you will be on "spike" from Monday morning (~7:00 am) to Thursday (~5:30 pm) and will be gone from home a lot during this time.
- If you are living in Arcata, then during the summer field work season you will travel to Fort Bragg weekly or biweekly and will probably spend the night either camping at MacKerricher State Park (showers are coin-operated and cost 50 cents to start) or at the Learning Center which has a kitchen (including a refrigerator), shared bathroom and individual rooms (though stay away from Room 5 – it locks behind you!)
- Everyone brings their own food, which they may or may not be prepared individually. RSL provides a camping stove, pots, and propane when camping.
- Past members have found that a light-weight long sleeve shirt is the best thing to take for protecting against scratches and bugs. That and a fleece should keep you as warm as you'll need to be. Also be sure to take raingear just in case.
- Poison-oak is out there, so if you're sensitive, be sure to have something like Tecnu (provided) with you.
- Have the post office hold your mail (if you don't have roommates) – <https://holdmail.usps.com/duns/HoldMail.jsp> - just remember to keep the confirmation number so that you can edit or cancel the request as needed.

ISP

- When calling a business to get the name to address a donation letter to, make sure to ask for the name of the person who handles the donation requests instead of asking for the name of the manager or owner.
- If you're doing your ISP with your site partner, keep all documents, especially donor contact information in the share folder on the K drive so that it is accessible to both members.
- Have your donation request letters ready to do at least 6 weeks in advance. Some companies need at least that long to process them.
- Call companies you requested donations from no later than one week from the day you gave them the letter. There are probably other WSP members looking for donations at the same time you are and there's only so much to go around.
- Any events in Arcata on public property require insurance (which AmeriCorps does have through the CCC) and a city application for the event.

TECs

- These are very challenging to fill out correctly. A sample TEC can be found in the site box



Site Protocols & Information

Winter field work supports streamflow gaging and Turbidity Threshold Sampling:

<http://www.fs.fed.us/psw/topics/water/tts/>

Summer field work includes assessing in-channel morphologic change, monitoring large woody debris, and measuring fine sediment in pools: <http://www.fs.fed.us/psw/topics/water/vstar/>

Publications, technical reports, data, and other information related to the Caspar Creek Experimental Watersheds can be found at: <http://www.fs.fed.us/psw/topics/water/caspar/>

Mentor Bio's

Sue Hilton is a hydrologist with the Arcata office of the Pacific Southwest Experimental Station. Her work focuses on stream channels, gully processes, and recruitment/longevity/transport of large wood in streams. During her long career, Sue has worked on river morphology studies from Mount Saint Helens to Chiapas Mexico and as a forester in California. She earned a BS in Forestry from University of Michigan and a MS in Natural Resources from Humboldt State University.

Liz Keppeler is also a hydrologist and field manager of the Caspar Creek Experimental Watersheds, Fort Bragg. With more than a quarter century on Caspar Creek, she has been involved in various hydrologic investigations and watershed process work of the PSW science team. Primarily, she focuses on measuring the streamflow and sediment response to forest management. Liz has worked for the forest service as a firefighter, resource planning aide, and district hydrologist. She earned BA in Environmental Studies and Geography from UC Santa Barbara and a MS in Natural Resources from Humboldt State University.